K-12 Game-a-thon

DESIGN YOUR OWN MATH GAME!

MIND Research Institute proudly sponsors this student challenge to cultivate and showcase game designs that feature creative and unusual solutions to mathematical problems. As students apply the math they are learning to gameplay, they may also launch a life-long love of math.

The Game-a-thon is open to teams of youth from across the United States. A team may consist of one or more participants, and all teams will need an adult coach or teacher who provides his/her contact information, acts on behalf of the team, and facilitates communications with the Game-a-thon coordinators.

Prepare Your Entry!

1 Build your team from your friends and/or classmates or you can go solo. Individuals may not be a member of more than one team, and one team may submit only one entry. Give your team a fun name! Make sure the grade levels of all team members fall within one of the below ranges.

Team Members' Grade Level(s):

- PreK through 2nd grade
- 3rd through 5th grade
- 6th through 8th grade
- 9th through 12th grade

2 Make sure that your game solves a mathematical problem that may be classified into one or more of the below math strands.

Math Strands:

- Counting & Cardinality
- Operations and Algebraic Thinking
- Number and Operations in Base Ten
- Measurement and Data
- Numbers and Operations-Fractions
- Geometry
- Ratios and Proportional Relationships
- The Number System
- Expressions and Equations
- Number and Quantity
- Functions
- Statistics and Probability
- Modeling
- Algebra

3 Brainstorm your ideas, and design a game that falls into one of the below game categories.

Game Categories:

- Card Games
- Traditional Board Games
- Computer Games
- Mobile Apps
- Outdoor Games
- Other Types of Games (not listed above)

4 Once you've designed and built a game, and tried it out with your friends or family, you are ready to videotape it, upload it for public viewing to YouTube™, and submit it to the Game-a-thon for evaluation.

Submission Requirements and Deadline

All entries must be submitted through an online application form (**available on January 1, 2017** at the Game-a-thon website), which must be filled out completely. Incomplete forms may lead to a disqualification from the Game-a-thon.

> Be sure to upload your video to **only** YouTube™
> and complete the online application between:
>
> # January 1, 2017 and July 1, 2017
>
> Submissions must be received by July 1, 2017 at midnight, GMT.

To complete the online application form, follow these instructions:

- The Team Coach or Teacher fills in his/her name and email address, and acknowledges he/she is over 18 years of age and willing to communicate with Game-a-thon coordinators on behalf of the team.

- Provide general information about the team, including the team's school district, team name, total number of team members, and grade-level range.

- Indicate the type of game (i.e., card game, traditional board game, computer game, mobile app, outdoor game or other type of game).

- Provide details about the game, including its title, a brief description, and the types of mathematics used in the game. Also provide a complete set of game instructions and rules. Details should be no longer than 2500 characters in length (approximately 1-2 pages). Game instructions and game controls must be written in English.

- Provide the link of the YouTube™ URL that features a video of the game. This video needs to be 2.5 to 3.0 minutes in length, and it needs to illustrate the actual game being played, or a model of the game being explained by team members. The video content may include animations, moving and/or still images, descriptive titles and text, and/or links to a website, blog or social media site, if that link allows viewers to play the game.

- The Team Coach or Teacher verifies the originality of the game and the team's willingness to abide by the guidelines of the Game-a-thon.

! **Note to parents and teachers**: In any media or public communications, MIND will not share individual student identities. Game-a-thon submissions may be identified by the team name, school district, and/or the name of the teacher/team coach.

Please note that by submitting an application form and a link to the video, the coach and team members are dedicating the game to the public and further agree and allow MIND Research to copy, modify, reproduce, promote and distribute the games for noncommercial distribution, and feature the games on its websites and social media sites. By submitting an application form and a link to the video, the coach and team members waive any rights over his or her image or likeness, and any rights of attribution or claims of authorship with respect to the game.

? **Any questions** may be directed to gameathon@mindresearch.org or mailed to:

K-12 Game-a-thon
MIND Research Institute
111 Academy, Suite 100
Irvine, CA 92617

YouTube is a registered trademark of Google, Inc.
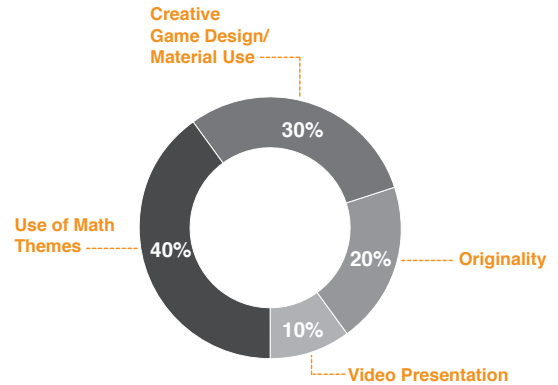
Additional Design Guidelines

- The game entries must be original, and designed and developed entirely by students.

- All content must be consistent with the Entertainment Software Rating Board's (ESRB) "Everyone" rating category.

- **Games can be single- or multi-player.** Anything from a 1-person game to a 10-person game is acceptable.

- For general appeal and ease of use, essential gameplay should be completed in **under an hour**.

- Board and card games may be designed and created with physical or virtual components, but must be original and complete (not an extension of an existing game). Card games may be based on the 52-card French deck, or students may develop custom cards.

- Likewise, computer games need to be a stand-alone and working version of an original game, which has been programed to function in a common computing environment, mobile app, or web browser. Computer games may be programmed in any language, and students new to programming are encouraged to try the SCRATCH game development environment that is produced by the Massachusetts Institute of Technology, and is available for download here.

- Outdoor games need to be played in a defined space, such as a backyard or park, and may not include any harmful materials or practices.

- Games must be free to play and may not include existing, copyrighted or trademarked characters or ideas.

Entries that do not conform to any of the above guidelines, or that are considered vulgar, obscene, offensive, discriminatory in intent or practice, or are otherwise inconsistent with the mission or reputation of MIND Research Institute may be eliminated from the online gallery of game videos. Moreover, MIND Research Institute reserves the right to reject or eliminate any entries from the online gallery, for any reason or no reason in its sole and absolute discretion. MIND employees and members of their immediate family are not eligible to win prizes.

Evaluation Criteria and Recognition

A team of educators, mathematicians and game designers (including JiJi), will review and evaluate all submissions. As shown in the chart below, the evaluation criteria will include considerations for:

Creative Game Design/Material Use -- 30%
Use of Math Themes -- 40%
Originality -- 20%
Video Presentation -- 10%

- Each team member will receive a Certificate of Participation, a commemorative pin and an original JiJi artwork.

- MIND will feature all eligible submissions in an online video gallery for public sharing.

The top 5 teams will receive a JiJi trophy and their videos will be inducted into the Game-a-thon "Hall of Fame".

Thank you and Good Luck!